Automated Supermarket

https://github.com/as2580/
SoftwareEngineeringGroup4

Demo #1

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Software Engineering Group 4

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System Requirements

- smart devices that can run browsers to access the applications
- tablets with network connections to act as the terminals
- AWS or local hardware on which to run the database

Terminals

Customer Assistance Terminal
- automatically assists customers without employee intervention for tasks such as:
  - finding products
  - checking prices

Checkout Terminal
- automates the checkout procedure, limiting the need for employee intervention

Returns Terminal
- allows for a simplified, more immediate return process

Task System

- implements a task board where
  - employees can claim and complete tasks,
  - tasks can be automatically generated, and
  - managers can create new tasks and update existing tasks
- improves employee coordination
- increases productivity and reduces redundancy
- streamlines and simplifies employee management

Example
(Manager Application)

Create Task

Task Name	Description	Task ID	State	Employee ID	Time of Task Creation	Time of Task Completion	Edit
Return Items to Shelves (Return Terminal Bin)	Return item(s) from bin at the Return Terminal	40	In Progress	16	Jan. 9, 2013, 6:43 p.m.	None	Edit
Restock Shelves (Careone Whitening Toothbrush Soft)	Restock the shelves for Careone Whitening Toothbrush Soft in Aisle 9	39	Complete	7	Jan. 9, 2013, 3:23 p.m.	Jan. 9, 2013, 3:45 p.m.	Edit
Assist Customer	Assist a customer at the Customer Assistance Terminal at the end of Aisle 8	38	Incomplete	None	Jan. 9, 2013, 5:23 p.m.	None	Edit
Return Items to Shelves (Aisle 3 Bin)	Return item(s) from bin at end of Aisle 3	37	In Progress	21	Jan. 9, 2013, 6:34 p.m.	None	Edit
Assist Customer	Assist a customer at the Customer Assistance Terminal at the end of Aisle 8	36	Complete	31	Jan. 9, 2013, 4:15 p.m.	Jan. 9, 2013, 4:20 p.m.	Edit
Return Items to Shelves (Checkout Terminal 1)	Return item(s) from bin at Checkout Terminal 1	35	In Progress	23	Jan. 9, 2013, 3:34 p.m.	None	Edit
Return Items to Shelves (Aisle 6 Bin)	Return item(s) from bin at end of Aisle 6	34	In Progress	35	Jan. 9, 2013, 4:34 p.m.	None	Edit
Assist Customer	Assist a customer at the Customer Assistance Terminal at the end of Aisle 8	33	Complete	14	Jan. 9, 2013, 3:32 p.m.	Jan. 9, 2013, 3:40 p.m.	Edit
Assist Customer	Assist a customer at the Customer Assistance Terminal at the end of Aisle 8	32	Complete	12	Jan. 9, 2013, 9:23 a.m.	Jan. 9, 2013, 9:53 a.m.	Edit
Return Items to Shelves (Aisle 4 Bin)	Return item(s) from bin at end of Aisle 4	31	In Progress	30	Jan. 9, 2013, 8:54 a.m.	None	Edit
Assist Customer	Assist a customer at the Customer Assistance Terminal at the end of Aisle 8	30	Complete	21	Jan. 9, 2013, 2:23 p.m.	Jan. 9, 2013, 2:34 p.m.	Edit
Restock Shelves (Barefoot Pinot Grigio 187)	Restock the shelves for Barefoot Pinot Grigio 187 in Aisle 3	29	In Progress	57	Jan. 9, 2013, 12:23 p.m.	None	Edit
Return Items to Shelves (Aisle 7 Bin)	Return item(s) from bin at end of Aisle 7	28	Complete	21	Jan. 9, 2013, 9:23 a.m.	March 28, 2020, 11:28 p.m.	Edit
Restock Shelves (Guava)	Restock the shelves for Guava in Aisle 5	27	In Progress	20	Jan. 9, 2013, 1:32 p.m.	None	Edit
Return Items to Shelves (Aisle 1 Bin)	Return item(s) from bin at end of Aisle 1	26	In Progress	1	Jan. 9, 2013, 11:24 a.m.	None	Edit
Assist Customer	Assist a customer at the Customer Assistance Terminal at the end of Aisle 8	25	Complete	3	Jan. 9, 2013, 12:15 p.m.	Jan. 9, 2013, 2:23 p.m.	Edit
Restock Shelves (Ahold Cocoa Almonds)	Restock the shelves for Ahold Cocoa Almonds in Aisle 11	24	Complete	15	Jan. 9, 2013, 8:15 a.m.	Jan. 9, 2013, 8:15 a.m.	Edit
Assist Customer	Assist a customer at the Customer Assistance Terminal at the end of Aisle 8	23	Complete	53	Jan. 9, 2013, 10:15 a.m.	Jan. 9, 2013, 10:20 a.m.	Edit
Return Items to Shelves (Aisle 2 Bin)	Return item(s) from bin at end of Aisle 2	22	Complete	41	Jan. 9, 2013, 8:15 a.m.	Jan. 9, 2013, 8:30 a.m.	Edit
test	test	21	Incomplete	0	None	None	Edit

The above screenshot shows the page that a manager would see after logging into the Manager Application.

Applications

Customer Application
- conveniently runs on customers' phones
- allows for price checking and product search
- allows registered customers to create shopping lists

Employee Application
- allows employees to claim tasks and to complete their claimed tasks

Manager Application
- allows the manager to create new tasks and to update or delete existing tasks

Database

- holds information about:
  - application logins
  - tasks
  - employees
  - products
  - transactions
  - customer shopping lists
- allows for a singular location for information accessed from multiple sources